

The level of knowledge about menopause and attitudes towards menopause in women in the climacteric period

Menopause attitudes and knowledge levels of women

Jule Eric Horasanlı¹, Nur Demirbas²

¹Department of Gynecology and Obstetrics

²Department of Family Medicine, Necmettin Erbakan University, Meram Faculty of Medicine, Konya, Turkey

Abstract

Aim: This study aimed to determine the level of awareness and knowledge about menopause in women aged 40–65 in the climacteric period, and examine the symptoms of menopause and the relationship with their attitudes towards menopause.

Material and Methods: The study included 224 women who applied to Obstetrics and Family Medicine outpatient clinics. The Sociodemographic Information Form, Menopause Information and Awareness Form, Menopause Attitude Assessment Scale (ATMS), and the Menopause Rating Scale (MRS) were applied to the participants.

Results: Among the participants, 71.0% had gone through menopause, whereas 21.0% had not, and 8.0% did not know whether they had gone through menopause or not. The mean age of the women who had gone through menopause was 47.79±4.5 years. While the mean ATMS score was 43.97±10.93, 37.9% of the women had a negative attitude (40 points and below). The mean MRS somatic complaint score was 6.43±3.74, the mean psychological complaint score was 6.21±4.09, and the mean urogenital complaint score was 3.88±2.65. There was a moderately significant negative correlation between their ATMS scores and their menopause-related psychological complaints ($r=-0.317$, $p<0.001$). As their positive attitude towards menopause increased, their psychological complaints decreased. As their awareness of menopause increased, their psychological complaints decreased.

Discussion: Increased awareness of menopause provided a decrease in the psychological complaints of menopause. In the study, it was seen that the attitudes of women toward menopause were an effective variable in the emergence of menopause complaints. Improving the attitudes of the women towards menopause is important for reducing menopausal symptoms.

Keywords

Menopause; Climacteric Period; Knowledge; Attitude

DOI: 10.4328/ACAM.20632 Received: 2021-04-01 Accepted: 2021-06-02 Published Online: 2021-07-29 Printed: 2021-09-15 Ann Clin Anal Med 2021;12(Suppl 4): S442-446

Corresponding Author: Nur Demirbas, Necmettin Erbakan University, Meram Faculty of Medicine, Department of Family Medicine, Konya, Turkey.

E-mail: ndemirbas76@hotmail.com P: +90 5053476672

Corresponding Author ORCID ID: <https://orcid.org/0000-0002-4038-9386>

Introduction

The life of a female consists of five periods, comprising childhood, adolescence, sexual maturity, menopause, and old age. Each of these periods has its own physical, psychological, and hormonal differences [1]. The climacteric period covers the perimenopausal, menopausal, and postmenopausal periods, and is a period of life in which the woman transitions from reproductive age to the age in which the reproductive cycle ends. After the final menstrual cycle, menopause is characterized as 12 months of amenorrhea, representing an almost complete but normal decrease in ovarian hormone secretion [2]. The average age for natural menopause is about 51 and varies in different populations [3]. On average, one-third of a woman's life passes in menopause. The menopausal period is an important period that brings many physical and psychological changes and significantly affects the family and society [4]. In order to have a healthy and happy period that cannot be underestimated for human life, women need to know how to deal with the problems of the menopausal period. Night sweats, hot flashes, and sleep problems, psychological problems (anxiety, depression, discomfort, sexual abstinence, etc.) and atrophic changes (vaginal atrophy, stress incontinence, and dyspareunia, etc.) are the most common problems during this period. Osteoporosis and cardiovascular diseases occur, as well. Although the exact causes of the complaints observed during menopause are not known, they are generally thought to be caused by the lack of estrogen [5]. The most common symptoms reported by women in the menopausal period are hot flashes and night sweats, which occur during the transition to menopause. Although it affects about 70% of women in Northern Europe and America, the prevalence of vasomotor symptoms and the experience of menopause vary significantly between cultures [6]. Moreover, eating habits, and cultural and ethnic differences are among the factors considered to be effective in the emergence of menopausal complaints [7]. Symptoms that occur in menopause cover as a whole the physical changes, cultural influences, and individual perceptions. To understand menopause well, it is necessary to take into account biological factors as well as psychological, social, and cultural ones.

Women's perceptions of menopause as a natural process of life or disease, and the developments in their lives that occur with middle age, affect their attitudes about menopause. In the studies on menopausal complaints, it was reported that the attitudes of women toward menopause were an effective variable in the occurrence and severity of menopause complaints. It is possible to reduce the frequency and severity of menopausal symptoms through studies aimed at improving menopause knowledge level and menopause attitude [7]. Sexual problems have an important place during menopause. Studies have reported a decrease in the sexual interest and frequency of sexual intercourse, a loss of sexual desire by 47%–85%, a decrease in the frequency of orgasms by 20%, a decrease in the frequency of sexual intercourse by 20%–70%, and an increase in dyspareunia in the first couple of years of menopause by 40%. These results are thought to be the result of estrogen deficiency, as well as androgen deficiency [8]. Maintaining the quality of life in menopause is an important goal, and it is one of the responsibilities of health professionals to eliminate the

complaints of women in this period, and to determine the quality of life and the situations associated with it. Patient education during menopause and knowing the symptoms experienced or likely to be experienced during menopause will make it easier for the woman to deal with these problems. In this context, this study aimed to determine the levels of knowledge and awareness of women about menopause in the climacteric period, to determine the symptoms of menopause and women's attitudes towards menopause, and compare them with their level of knowledge.

Material and Methods

Type, place, and population of the research Women between the ages of 40 and 65, who consulted the Obstetrics and Family Medicine outpatient clinics, between October and November 2020, were included in this study, which was planned as descriptive and cross-sectional research.

Ethical permission for the study

Ethical permission for the study was granted prior to the start of the study by the Ethics Committee (Number:2020/2941). Participants were informed about the study, and their written and verbal consent was obtained according to the ethical principles of the Helsinki Declaration.

Data collection tools

A four-section questionnaire was filled out using a face-to-face interview method, which was applied to volunteer participants who agreed to participate in the study. Patients receiving hormone replacement therapy, Spironolactone, selective serotonin reuptake inhibitor, or antidepressant therapy were excluded from the study.

Sociodemographic Information Form: The questionnaire, which contains introductory information about a person, consists of 8 questions about their age, marital status, income level, level of education, and menopausal status.

Menopause Knowledge and Awareness Form: The literature on the subject was scanned and prepared by the researchers. In this form, which consists of 10 questions about knowledge and awareness concerning menopause, the total menopause knowledge and awareness score was calculated by giving 1 point for correct answers, and 0 points for false answers as well as "I don't know" answers. The first 5 questions in the form measure general information about menopause and the last 5 questions measure the awareness that the woman has of her own menopause period.

Menopause Attitude Assessment Scale: The Menopause Attitude Assessment Scale (ATMS) was developed by Uçanok (1994) to measure the attitudes of women of different age groups towards menopausal life and its aftermath [9]. A high score obtained from the scale shows a positive attitude towards menopause, while a low score shows a negative attitude. It is accepted that the attitude is more positive as the scores increase above the average score 40. The Cronbach Alpha coefficient of the scale is 0.86.

Menopause Rating Scale: The Menopause Rating Scale (MRS) was developed by Schneider et al. to measure the severity of menopausal symptoms and was adapted to Turkish by Gürkan (2005) in Turkey. The total score of the scale is calculated based on the scores given for each item. The lowest score that can be

obtained is 0 and the highest score is 44. The increase in the total score on the scale shows an increase in the severity of the complaints experienced.

Statistical analysis

In the study, when evaluating all the data obtained through surveys that were filled out using the face-to-face interview method, the mean and standard deviation values of the numerical data were calculated. Normal distribution conformity was evaluated using the Kolmogorov-Smirnov test; categorical and numeric data were compared using statistical analyses, such as chi-square test, student t-test, and one-way ANOVA. $P < 0.05$ was considered statistically significant. The reliability scores of each scale were calculated via the Cronbach alpha; correlation analysis was used to determine the relationship between the level of knowledge, and attitudes and symptoms.

Results

The study included 224 women with a mean age of 53.0 ± 6.1 (42–65) years. Among the participants, 75.9% ($n=170$) were married, whereas 7.6% ($n=17$) were single, and 16.5% ($n=37$) were divorced. ($n=74$); 33.0% were primary school graduates, 63.8% ($n=143$) had a balance of income and expenses, and 58.0% had no chronic diseases. Moreover, 71.0% of the respondents had gone through menopause, whereas 21.0% had not; and 8.0% did not know if they were menopause or not. The mean age of the first menstrual period of the women was 13.02 ± 1.31 (10–16) years, the median number of births was 2 (0–9), the mean menopausal age of women who had gone through menopause was 47.79 ± 4.5 (38–58) years (Table 1). Nearly half (56.7%) of the respondents said that they had previously received information about menopause. Among these women, 59.4% had received information from doctors, whereas 18.8% from midwives, 12.1% from social media, 18.3% from acquaintances, and 8% received it from radio-TV. Among the participants, 82.6% thought that women who had gone through menopause or doubted so should consult a doctor. The mean menopause knowledge score of the women was 4.90 ± 2.63 (1–10), and the average awareness score was 4.08 ± 1.40 (1–6). Those with higher levels of education had higher awareness scores, and those with lower income levels had lower awareness.

While the mean ATMS score of the women was 43.97 ± 10.93 (11–70), 37.9% had a negative attitude (40 points and below) and 62.1% had a positive attitude (above 40 points). A statistically significant relationship was found between the marital and educational status of the participants and the ATM score ($p=0.008$). The ATMS score of those who were married (44.95 ± 11.35) was higher than that of the single women (40.89 ± 8.91).

On the MRS scale, the mean somatic complaint score was found to be 6.43 ± 3.74 , whereas the psychological complaint score was 6.21 ± 4.09 , urogenital complaint score was 3.88 ± 2.65 , and the total mean MRS score was 16.53 ± 8.92 . A statistically significant relationship was found between the marital status, educational status, presence of chronic disease, and menopause status of the participants, and the MRS score ($p < 0.001$).

Psychological complaints (7.46 ± 4.68), urogenital complaints (4.31 ± 2.98), and MRS total scores (18.02 ± 10.14) of the women

with negative attitudes about menopause were found to be statistically significantly higher than those of the women with positive attitudes ($p=0.001$, $p=0.038$, and $p=0.049$, respectively) (Table 2). Somatic (7.64 ± 3.71), psychological (8.21 ± 4.28), and urogenital (5.90 ± 2.78) complaints of the women who indicated that they performed no physical activity in daily life and lived a sedentary life were found to be higher than those who performed mild to moderate physical activity ($p=0.045$, $p=0.002$, $p=0.002$, and $p < 0.001$).

Among the women, 31.7% ($n=71$) were in the perimenopausal period, 28.1% ($n=63$) were in the menopausal period, and 40.2% ($n=90$) were in the postmenopausal period. Somatic (8.05 ± 3.34), psychological (7.43 ± 3.89), and urogenital (3.79 ± 2.94) complaints of the women in the menopausal period were higher than those of the women in the perimenopausal and postmenopausal periods ($p < 0.001$). While the attitudes of the women about menopause did not change in any of the 3 stages of the climacteric period, the level of knowledge about menopause was higher in menopausal women than in women in the perimenopausal and postmenopausal periods ($p < 0.001$) (Table 3).

There was a moderately significant negative relationship between the ATMS scores of the women participating in the study and their psychological complaints due to menopause ($r=0.317$, $p=0.001$). As their positive attitude towards menopause increased, their psychological complaints decreased. However, there was a moderately significant negative relationship between the menopause awareness status and psychological complaints of the women ($r=-0.288$, $p=0.001$). As their menopause awareness increased, their psychological complaints decreased.

Table 1. Comparison of the sociodemographic information of the participants with their menopausal symptoms and attitudes towards menopause

	Menopause Attitude Assessment Scale		Menopause Rating Scale	
	mean±SD	p*	mean±SD	p*
Marital status				
Married	170(75.9%)	44.95±11.35	15.41±9.30	<0.001
Single	54(24.1%)	40.89±8.91	20.41±6.47	
Education status				
Primary school	74(33.0%)	42.96±11.83	14.76±9.82	<0.001
High school	50(22.3%)	40.94±10.31	22.82±7.34	
University	73(32.6%)	46.70±10.42	15.53±7.90	
Postgraduate	27(12.1%)	45.00±9.36	12.41±5.61	
Income status				
Low	33(14.7%)	46.00±10.49	19.27±10.32	0.155
Equal	143(63.8%)	43.27±11.85	16.15±9.18	
High	48(21.4%)	44.69±7.90	15.77±8.61	
Chronic disease				
No	94(42.0%)	45.28±11.12	13.46±8.68	<0.001
Yes	130(58.0%)	43.03±10.73	18.78±8.44	
Menopausal status				
Yes	159(71.0%)	43.67±9.67	18.65±8.05	<0.001
No	47(21.0%)	45.77±14.30	9.45±8.88	
Don't know	18(8.0%)	42.00±11.42	16.28±6.84	

*independent t test/One-way ANOVA

Table 2. The relationship between menopausal attitude level and menopausal symptoms

	The Menopause Attitude Assessment Scale		P*
	40 points and below negative attitude	above 40 points positive attitude	
Somatic complaints	6.26±3.75	6.54±3.75	0.587
Psychological complaints	7.46±4.68	5.47±3.49	0.001
Urogenital complaints	4.31±2.98	3.62±2.40	0.038
MRS total	18.02±10.14	15.61±7.98	0.049

*Kruskal- Wallis test; MRS: Menopause Rating Scale

Table 3. Comparison of women's menopausal status with menopausal complaints, attitudes towards menopause and menopause awareness

	Perimenopause n=71	Menopause n=63	Post menopause n=90	P
	Mean±SD	Mean ±SD	Mean ±SD	
Somatic complaints	4.27±3.49	8.05±3.34	7.01±3.44	<0.001
Psychological complaints	4.37±3.83	7.43±3.89	6.82±3.96	<0.001
Urogenital complaints	3.10±2.45	3.79±2.94	4.56±2.43	0.002
MRS total	11.73±8.60	19.27±7.51	18.39±8.64	<0.001
ATMS	44.68±13.12	44.60±9.25	42.98±10.13	0.538
Menopause knowledge	3.79±2.11	6.13±2.53	4.91±2.70	<0.001
Menopause awareness	3.92±1.6	4.32±1.18	4.03±1.31	0.240

ATMS: Menopause Attitude Assessment Scale MRS: Menopause Rating Scale

Discussion

Menopause and its complications can impair the feeling of well-being and health, and affect the quality of life. The intensity and effect of menopausal symptoms differ among people and societies. Some women may experience more severe symptoms that can have a profound impact on their personal and social performance, and quality of life, and cause them to encounter numerous serious problems in their lives. Therefore, the severity of menopause symptoms can affect their quality of life, both physiologically and psychologically [10].

The age of menopause differs from society to society. The menopausal age in Turkey varies between 48–51 years [11]. In the present study, the average age at onset of natural menopause in the women was calculated as 47.79±4.5 (38–58) years. In the current study, 37.9% of the participants were found to have a negative attitude towards menopause, whereas 62.1% had a positive attitude. When evaluating studies in the literature on women's attitudes towards menopause, reports of both positive and negative attitudes were found. An Iranian study found that 6.3% of women had a negative attitude towards menopause, whereas 71% had a neutral attitude, and 22.8% had a positive attitude [12]. One study found that women with negative attitudes towards menopause reported more frequent complaints when compared to women with positive attitudes [13]. In the present study, the psychological and genitourinary complaint scores of the women who had negative attitudes about menopause were found to be higher than those of women who had positive attitudes. Women with a positive attitude reported significantly fewer symptoms of menopause. The reason why women during menopause with high levels of

education had higher physical quality of life scores may have been due to the fact that they were more advantageous in regular access to health care, they were informed, and they consulted physicians. According to the research, a negative relationship was found between the level of knowledge and the severity of menopause symptoms [14]. That is to say, less educated women experience more severe symptoms, and highly-educated women are more aware of the menopause symptoms, strategies to deal with them, and are more likely to look for treatment for their symptoms. In the present study, the results showed that women with a higher level of education women had a positive attitude about menopause and a healthy living. This study has found a relationship between the marital status, educational status, presence of chronic diseases and menopausal status of the women, and the severity of their menopause symptoms. Symptom severity was found to be lower in the married women. With a clear statement, menopausal symptoms were less felt in the participants who were married or had a high level of education. The menopausal period is also a process in which a large number of chronic diseases appear. Sometimes it can be quite difficult to distinguish between symptoms caused by chronic diseases and those caused by estrogen deficiency. Numerous studies have reported that more symptoms of menopause were observed among women with chronic diseases [15].

To reduce psychological and vasomotor symptoms, it is recommended to exercise during menopausal and perimenopausal periods. Doing exercise generally has positive effects on mood and sleep disorders in women. Vasomotor symptoms such as hot flashes and night sweats improve with weight loss involving physical activity in obese women who have a higher body mass index [16]. It also has a positive relationship with lowering cholesterol, triglycerides, apolipoprotein, and glucose levels [17], and accordingly, is associated with reducing the symptoms of hot flashes [18]. On the contrary, Poppel et al. showed that physical activity did not reduce vasomotor and mental symptoms during menopause [19]. A study involving middle-aged Australian women stated that exercise was beneficial for somatic and psychological symptoms, such as depression and anxiety, but not for vasomotor symptoms or sexual function [20]. As a result of estrogen deprivation during the menopause transition, the sex drive of women decreases, and vaginal dryness, signs of thinning of the wall of the womb and sexual dysfunction commonly occur. A study of 42 women in the postmenopausal periods, did not report any effects on genitourinary complaints or sexual symptoms [18]. However, in a cross-sectional study of 151 women who practiced physical activity, improvement in sexual symptoms was reported [21]. In the study presented herein, the somatic, psychological, and genitourinary complaints of the women who stated that they pursued a sedentary life were found to be higher than those whose physical activity was at mild to moderate levels.

It is known that the level of estrogen in the blood is lower in women who smoke when compared to non-smokers. It can be thought that lower estrogen levels may cause more severe menopausal symptoms [22]. The presented study also found a significant relationship between smoking and menopausal symptoms. In several studies, the Internet and friends have

been the source of information about menopause [23,24]. Asian women did not report a need for information because they perceived menopause as a natural transition period [25]. In the presented study, approximately half of the participants stated that they had knowledge of menopause symptoms in advance, whereas 59.4% stated that they had discussed menopause symptoms with other individuals.

Conclusion

It is possible to reduce the frequency and severity of menopause symptoms through research aimed at improving the menopause attitude of women. An increase in awareness concerning menopause leads to a decrease in menopausal psychological complaints. As in studies on menopausal complaints, it was seen in this study that women's attitudes toward menopause were an effective variable in the emergence of menopausal complaints. The positive development of women's attitudes towards menopause was important in reducing their menopausal symptoms. It was concluded that the health and lifestyle behaviors of women, as well as an evaluation of potential tools or programs to combat menopausal symptoms and improvement in overall quality of life during the menopause transition, are important, especially in groups of patients with low levels of education and income. In this study, it was found that there was a significant relationship between the menopausal complaints of the women and their attitude towards menopause, and that having a positive attitude towards menopause caused fewer menopausal complaints. According to this result, it can be said that the symptoms of menopause decrease as the positive attitude towards menopause increases. Lifestyle changes and training to be applied for menopause should be evaluated according to the realities of the country.

Scientific Responsibility Statement

The authors declare that they are responsible for the article's scientific content including study design, data collection, analysis and interpretation, writing, some of the main line, or all of the preparation and scientific review of the contents and approval of the final version of the article.

Animal and human rights statement

All procedures performed in this study were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards. No animal or human studies were carried out by the authors for this article.

Funding: None

Conflict of interest

None of the authors received any type of financial support that could be considered potential conflict of interest regarding the manuscript or its submission.

References

1. Yurdakul M, Eker A, Kaya D. Evaluating the Life Quality of the Women in the Menopausal Period. *F.U. Sağ Bil Derg.* 2007;21(2):187-93(in Turkish).
2. Soules MR, Sherman S, Parrott E, Rebar R, Santoro N, Utian W, et al. Executive summary: Stages of Reproductive Aging Workshop (STRAW). *Fertil Steril.* 2001;76(5):874-8. DOI: 10.1016/s0015-0282(01)02909-0.
3. Gold EB, Bromberger J, Crawford S, Samuels S, Greendale GA, Harlow SD, et al. Factors associated with age at natural menopause in a multiethnic sample of midlife women. *Am J Epidemiol.* 2001;153(9):865-74. DOI: 10.1093/aje/153.9.865.
4. Sis Çelik A, Pasinlioğlu T. Symptoms experienced in climacteric period and the role of nurse. *ERÜ Sağ. Bil. Derg.* 2013;1(1):50-6. (in Turkish).
5. Ayers B, Forshaw M, Hunter MS. The impact of attitudes towards the menopause on women's symptom experience: A systematic review. *Maturitas.* 2010;65(1):28-36. DOI:10.1016/j.maturitas.2009.10.016
6. Freeman EW, Sherif K. Prevalence of hot flushes and night sweats around the world: a systematic review. *Climacteric.* 2007;10(3):197-214.
7. Towey M, Bundy C, Cordingley L. Psychological and social interventions in the menopause. *Cur Op Obst Gyn.* 2006;18:413-17.
8. Dennerstein L, Lehert P, Burger H. The relative effects of hormones and

relationship factors on sexual function of women through the natural menopausal transition. *Fertil Steril.* 2005;84(1):174-80. DOI: 10.1016/j.fertnstert.2005.01.119.

9. Uçanok Z, Bayraktar R. Examination of menopausal symptoms, attitudes and life perspectives in women of different age groups. *Journal of 3P.* 1996;4:11-20. (in Turkish).

10. Asgari P, Mahmoudi M. The effect of *Glycyrriza glabra* on quality of life in postmenopausal women. *Complementary Medicine Journal.* 2021; 6(19):1480-9.

11. Pınar SE, Yıldırım G, Duran O, Cesur B. A problem peculiar to women: Mental health in menopause. *Journal of Human Sciences.* 2015; 12(2):787-98.

12. Ghorbani R, Nassaji M, Shahbazi A, Tabar SB, Rahaei F. Attitudes toward menopause among middle-aged women in Semnan, Iran. *J Egypt Public Health Assoc.* 2014; 89(1):42-5.

13. Yanikkerem E, Koltan SO, Tamay AG, Dikayak S. Relationship between women's attitude towards menopause and quality of life. *Climacteric.* 2012;15(6): 552-62.

14. Lee MS, Kim JH, Park MS, Yang J, Ko Y-H, Ko S-D, et al. Factors influencing the severity of menopause symptoms in Korean post-menopausal women. *J Korean Med Sci.* 2010;25(5):758-65. DOI:10.3346/jkms.2010.25.5.758

15. Schwarz S, Völzke H, Alte D, Schwahn C, Grabe HJ, Hoffmann W, et al. Menopause and determinants of quality of life in women at midlife and beyond: the study of health in pomerania (SHIP). *Menopause.* 2007;14(1):123-34. DOI: 10.1097/01.gme.0000227860.58097.e9.

16. Huang AJ, Subak LL, Wing R, West DS, Hernandez AL, Macer J, et al. An intensive behavioral weight loss intervention and hot flashes in women. *Arch Intern Med.* 2010;170(13):1161-7. DOI:10.1001/archinternmed.2010.162

17. Agil A, Abike F, Daskapan A, Alaca R, Tuzun H. Short-term exercise approaches on menopausal symptoms, psychological health, and quality of life in postmenopausal women. *Obstet Gynecol Int.* 2010; DOI:10.1155/2010/274261

18. Elavsky S, Molenaar PC, Gold CH, Williams NI, Aronson KR. Daily physical activity and menopausal hot flashes: applying a novel within-person approach to demonstrate individual differences. *Maturitas.* 2012; 71(3):287-93.

19. van Poppel MN, Brown WJ. It's my hormones, doctor--does physical activity help with menopausal symptoms? *Menopause.* 2008;15(1):78-85.

20. Mirzaiinjabad K, Anderson D, Barnes M. The relationship between exercise, body mass index and menopausal symptoms in midlife Australian women. *Int J Nurs Pract.* 2006;12(1):28-34.

21. Haimov-Kochman R, Constantini N, Brzezinski A, Hochner-Celnikier D. Regular exercise is the most significant lifestyle parameter associated with the severity of climacteric symptoms: a cross sectional study. *Eur J Obstet Gynecol Reprod Biol.* 2013;170(1):29-34.

22. Gallicchio L, Miller SR, Visvanathan K, Lewis LM, Babus J, Zacur H, et al. Cigarette smoking, estrogen levels, and hot flashes in midlife women. *Maturitas.* 2006; 53(2):133-43.

23. Trudeau KJ, Ainscough JL, Trant M, Starker J, Cousineau TM. Identifying the educational needs of menopausal women: a feasibility study. *Womens Health Issues.* 2011; 21(2):145-52.

24. Chae HD, Choi SY, Cho EJ, Cho YM, Lee SR, Lee ES, et al. Awareness and experience of menopausal symptom and hormone therapy in Korean postmenopausal women. *J Menopausal Med.* 2014; 20(1):7-13.

25. Im EO, Ko Y, Hwang H, Chee W. Symptom-Specific or Holistic: Menopausal Symptom Management. *Health Care Women Int.* 2012;33(6):575-92.

How to cite this article:

Jule Eric Horasanlı, Nur Demirbas. The level of knowledge about menopause and attitudes towards menopause in women in the climacteric period. *Ann Clin Anal Med* 2021;12(Suppl 4): S442-446